On page 7, line 36, delete "Drawing" and insert:

--BRIEF DESCRIPTION OF THE DRAWINGS-- .

Page 8, line 11, delete "Exemplary embodiments" and insert:

--DETAILED DESCRIPTION OF THE INVENTION--.

IN THE CLAIMS:

On page 17, line 1, delete "Patent Claims" and insert:

--WHAT IS CLAIMED IS:--.

Cancel claims 1-17, without prejudice.

Add the following new claims 18-34:

--18. (New) A device for etching a patterned silicon body substrate (10) with a plasma (14), comprising: a plasma source (13) for generating a high-frequency electromagnetic alternating field power to be applied to the plasma source with assistance of a high-frequency generator (17); a reactor (15) for generating the plasma (14) from reactive particles through the action of the high-frequency electromagnetic alternating field upon a reactive gas or a reactive gas mixture; and a first means for producing a periodical change in the high-frequency power applied to the plasma source (13).

19. (New) The device according to Claim 18, wherein the first means is: a component for controlling the power of the high-frequency generator in which component a digital ramp generator is programmed via a software, or a component (18) for controlling the power of the high-frequency generator which component has an analog ramp generator (19).

20. (New) The device according to Claim 19, wherein the analog ramp generator (19) has an RC circuit (23, 24, 25) which is provided with at least one diode.

21. (New) The device according to Claim 18, further comprising a second means which, during the periodical change in the high-frequency power applied to the plasma source (13), at least temporarily adapts the output impedance of the high-frequency

generator (17) to the prevailing impedance of the plasma source (13) which changes as a function of the high-frequency power.

22. (New) The device according to Claim 21, wherein the adaptation of the output impedance is carried out continuously or stepwise and is automated and wherein the applied high-frequency power lies between 400 W and 5000 W.

23. (New) The device according to Claim 21, wherein the second means is an impedance transformer (16).

24. (New) A method for anisotropically etching a substrate (10) using the device according to Claim 18, comprising the steps of carrying out the anisotropic etching process in separate etching and polymerization steps alternatingly following each other, and applying a polymer to lateral patterns defined by an etching mask during the polymerization steps, the polymer being removed again in each case during the subsequent etching steps, wherein, during the etching steps, at least temporarily, and in each case higher high-frequency power is applied to the plasma source (13) than during the deposition steps.

25. (New) The method according to Claim 24, wherein during the etching steps, at least temporarily, a high-frequency power of 800 watts to 5000 watts, in particular, of 2000 watts to 4000 watts is applied to the plasma source (13), and during the deposition steps, at least temporarily, a high-frequency power of 400 watts to 1500 watts, in particular, of 500 to 1000 watts is applied to the plasma source.

26. (New) The method according to Claim 24, wherein the increase in the high-frequency power during the change from the deposition steps to the etching steps or the decrease in the high-frequency power during the change from the etching steps to the deposition steps are carried out stepwise or continuously.

27. (New) The method according to Claim 26, wherein at least the increase in the high-frequency power is carried out in such a manner that during this time, at least temporarily, the impedance of the high-frequency generator (17) is adapted to the plasma impedance at least approximately in a, in particular, continuous or stepwise and automated manner via the second means, in particular, via the impedance transformer (16).

28. (New) The method according to Claim 26, wherein the duration of the increase in the high-frequency power during the change from a deposition step to an etching step is 0.2 sec to 5 sec, in particular, 0.5 sec to 3 sec and/or that the duration of the decrease in the high-frequency power during the change from an etching step to a deposition step is 0 sec to 2 sec, in particular, 0 sec to 0.5 sec.

29. (New) A device for igniting a plasma (14) and for adjusting upward or pulsing a plasma power, comprising: an inductive plasma source (13), for generating a high-frequency electromagnetic alternating field, it being possible for a high-frequency power to be applied to the plasma source with the assistance of a high-frequency generator (17); a reactor (15) for generating the plasma (14) from reactive particles through the action of the high-frequency electromagnetic alternating field upon a reactive gas or a reactive gas mixture; and a means which permits adjustment of a continuous or stepwise increase in the high-frequency power applied to the plasma source (13), starting from a starting value, to a target value.

30. (New) The device according to Claim 29, wherein the means is: a component for controlling the power of the high-frequency generator (17) in which component a digital ramp generator is programmed via a software, or a component (18) for controlling the power of the high-frequency generator (17) which component has an analog ramp generator (19).

31. (New) The device according to Claim 29, further comprising an impedance transformer (16) which, during the increase in the high-frequency power, at least temporarily, adapts the output impedance of the high-frequency generator (17) to the prevailing impedance of the plasma source (13) in a an, in particular continuous or stepwise and automated manner, the impedance of the plasma source changing as a function of the high-frequency power.

32. (New) A method for igniting a plasma (14) and for adjusting upward a plasma power using the device according to Claim 29, wherein the continuous or stepwise increase in the high-frequency power from the starting value to the target value is accompanied by an at least temporary impedance adaptation of the high-frequency generator (17) to the